CBDA – ISB Meeting Sept 21, 2004

Overview of EWA, Coordination and EWP Roger Guinee and Dave Harlow

- Purpose: A cooperative CBDA program to provide protection to the fish of the Bay-Delta estuary beyond the regulatory baseline through environmentally beneficial changes in SWP/CVP operations at no uncompensated water cost to the project's water users.
- Authority/funding: CBDA has been funded directly from Proposition 204 and Proposition 50 funds. EWA purchases surface water and groundwater from willing sellers both north and south of the Delta.
- **EWA Agencies:** CDWR, CDFG, FWS, NOAA Fisheries, USBR

Technical basis:

- Published literature, CDFG reports, IEP investigations, etc.
- Three "Tiers" of assets, including Biological Opinions for delta smelt and listed salmonids
- Delta smelt (DSRAM) and salmon decision trees, based on real-time monitoring
- EWA fish actions are monitored, evaluated, and may be modified based on the best science available
- Annual external scientific reviews with EWA Technical Review Panel

Accomplishments:

- EWA fish actions have been implemented since 2001, and have been focused on Delta export curtailments to protect listed fish species and provide regulatory commitments.
- Three EWA transfers have been specifically timed to provide instream benefits to fish
- Since 2001 total EWA fish actions annually have ranged from approx 124,000 AF in 2004 to approx 348,000 AF in 2003.
- EWA funds were used to provide instream temperature benefits on the American River, by paying for lower river outlet releases in 2001 and 2002.

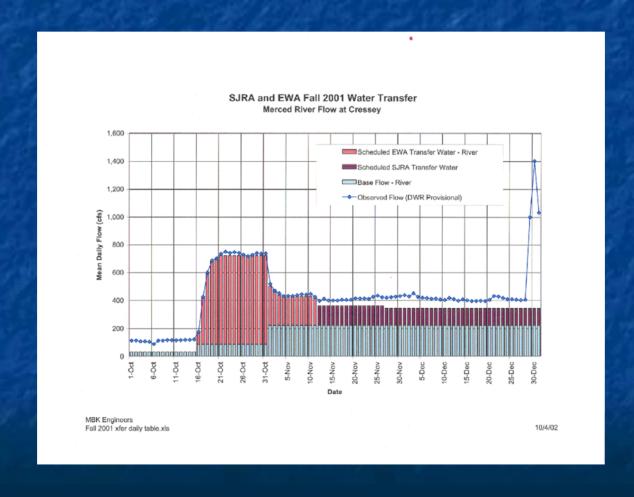
Coordination:

- Coordinated with WAP (b)(3) releases on San Joaquin tributaries and CVP (b)(2) export reductions when implementing VAMP
- Coordinated with WAP on Merced River in the fall of 2001
- Coordinated with (b)(2) releases on the American River
- Coordinated with SWP operations on the Feather River
- Weekly coordination through meetings of WOMT, EWAT, B2IT, DAT, other meetings with EWA Science Advisors and interested parties

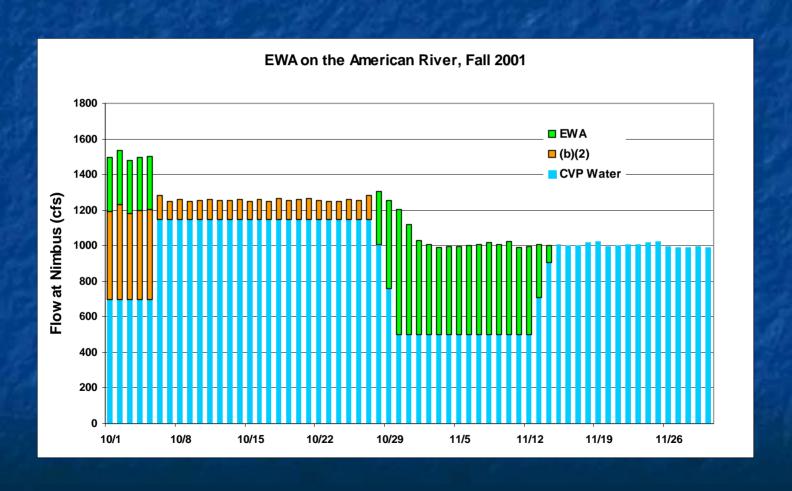
EWA Coordination with VAMP (April 15 - May 15)

- (b)(2) releases on the Stanislaus River
- WAP (b)(3) releases on the Stanislaus, Tuolumne and Merced rivers
- CVP export reductions using (b)(2) water
- SWP export reductions using EWA
- Monitoring and evaluation while meeting mgt objectives

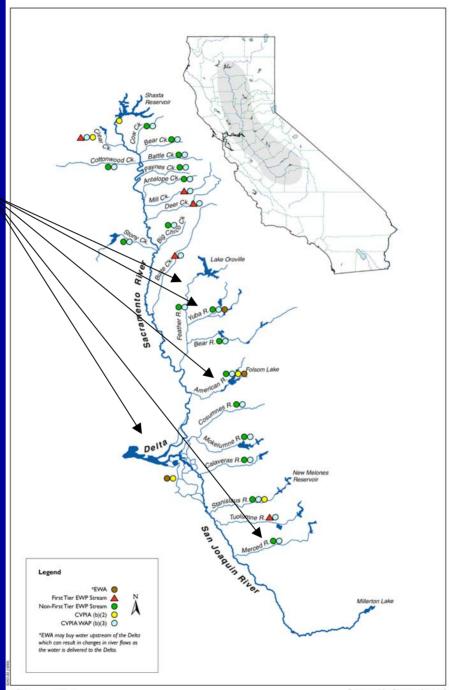
EWA Coordination with WAP releases on the Merced River



EWA Coordination with (b)(2) releases on American River



EWA
Larger systems with available water from willing sellers.
Mostly Delta
Actions.



Purpose

- A CBDA program focused on acquiring water from willing sellers on streams tributary to the Sacramento and San Joaquin systems to assist in carrying out the flow related goals of the Ecosystem Restoration Program (ERP). Objectives:
 - To improve salmon spawning and juvenile survival
 - To restore critical instream and channel-forming flows
 - To provide flows and habitat conditions for fish protection and recovery

Authority/funding: CBDA program funded through ERP

ERP Implementing Agencies: USFWS, CDFG, NOAA Fisheries, coordinated with CDWR and USBR as needed

Technical Basis:

All actions designed to test hypotheses regarding water management in a manner that:

- Facilitates learning through adaptive management
- Includes appropriate monitoring
- Will be peer reviewed by an external scientific panel prior to approval

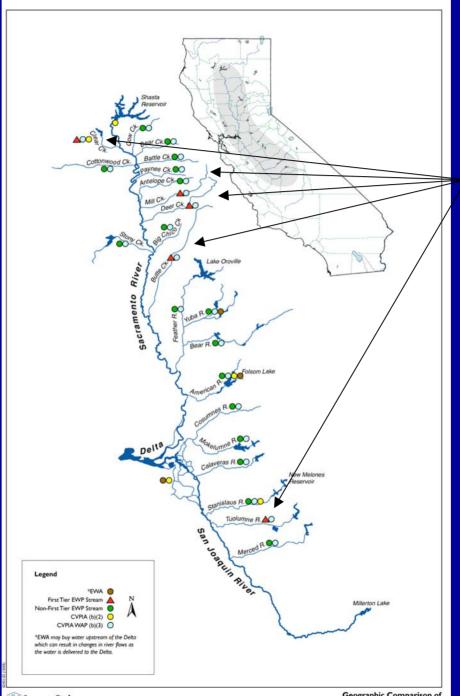
EWP currently working on priority tributaries to develop locally supported objectives and proposals for increased flows.

Tier 1 streams:

- 1. Clear Creek
- 2. Mill Creek
- 3. Deer Creek
- 4. Butte Creek
- 5. Tuolumne River

Coordination:

- The EWA and SWP will share equally the EWP and (b)(2) upstream releases pumped by the SWP after they have served their EWP and (b)(2) purposes.
- Outreach and coordination with EWAT, B2IT and WAP.
- ERPIAMs, Restoration Subcommittee, ERP Science Board
- EWP Core Team FWS, DFG, NOAA-F, meets with BOR, DWR(EWAT), and other interested parties
- Increase EWP participation in coordination teams as the program develops.



EWP

Smaller streams with at-risk species present. Tier 1 streams shown.